AMENDMENTS TO THE SPECIFICATION

Please amend the TITLE OF THE INVENTON to reflect the title on the signed declaration as follows:

NARROW BANDWIDTH, PICO-SECOND, BETA BARIUM BORATE-MASTER OSCILLATOR POWER AMPLIFIER SYSTEM AND METHOD OF OPERATION OF SAME

Please replace paragraph **[0007]** of the published patent application with the following amended paragraph:

[0007] Guyer et.al., "Tunable Pulsed Single Longitudinal Mode Optical Parametric Oscillator," U.S. Pat 5,235,456 (1993) shows in FIG. 1, the optical parametric oscillator 2 as including a pump laser source that transmits pulses of optical energy along a pump path 4. The optical parametric oscillator 2 comprises a first means for reflecting optical energy 10, that may be, for example, an optical ~~elements~~ element such as a back cavity mirror. The first means for reflecting 10 reflects optical energy along the reflective optical path 8 that it receives along the reflective optical path 8. The oscillator 2 also comprises a means for diffracting optical energy 12 that may be, for example, an optical element such as a glancing incidence grating.

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Please replace paragraph **[0011]** of the published patent application with the following amended paragraph:

[0011] The prior art could generate narrow bandwidth picosecond pulses only by first generating narrow bandwidth pulses with a tunable pulse with a nano-second laser, and then amplifying this pulse with a second pico-second laser. This is a relatively complex and expensive optical system. What is needed is a more integrated system by which narrow bandwidth picosecond pulses can be generated.

Please replace paragraph **[0016]** of the published patent application with the following amended paragraph:

[0016] The grating-mirror termination on one end of the cavity is comprised of a grazing incidence grating and a tuning mirror. The grating and mirror is are arranged with respect to each other so that a diffracted first order is reflected back from the mirror to the grating and into the cavity. In the illustrated embodiment the grazing incidence grating has a periodicity of about 1800 grooves/mm, and is inclined at an approximately 10° angle with respect to the axis of the cavity. The groove density or grating constant can be chosen according to the center of the tuning range for the apparatus. The grazing incidence grating has a blaze optimized for grazing incidence to maximize a first grating order of diffraction.

Please replace paragraph **[0045]** of the published patent application with the following amended paragraph:

[0045] The commonly used definition of the Fourier limit is $\Delta v\ \Delta \tau = 1$ assuming a pulse with a square temporal profile and spectral distribution within the first zero points of a Sinc function, Δv is the bandwidth in Hz and $\Delta \tau$ is the duration of the pulse in seconds. From this definition, the bandwidth of a pulse with a duration of 25 ps will be larger than 1.33 cm^{-1}, remarkably close to the observed limiting value. ~~However, when one makes the more realistic assumption that both the temporal profile and the spectral distribution are Gaussian functions, the Fourier limit is defined by $\Delta v\ \Delta \tau = 4Ln(2)/\pi = 0.88$. The width of these profiles is defined as the full width half maximum (FWHM). A pulse with duration of 25 ps will then have a minimum bandwidth of 1.17 cm-1, which is smaller than the value measured.~~